

## ABSTRACT OF THE DISCLOSURE

A carbonation system comprises a vessel for carbonating a liquid, a CO<sub>2</sub> supply connected to the vessel so as to create a CO<sub>2</sub> atmosphere in the vessel, an 5 inlet diffuser through which the liquid enters the vessel, and an outlet pipe through which the carbonated liquid exits the vessel. The inlet diffuser comprises a plurality of openings arranged on its vertical face, such that when the liquid exits the inlet diffuser through the plurality of openings, the liquid is substantially atomized and the atomized liquid is ejected in a direction that is substantially parallel to the 10 longitudinal axis of the vessel. The plurality of openings can be arranged in horizontal rows so that openings in adjacent rows are not in vertical alignment with each other. In addition, the atomized liquid can be ejected at an upward angle relative to the longitudinal axis of the vessel.

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